

STIC Biotechnology Systems Branch

RAW SEQUENCE LISTING ERROR REPORT

The Biotechnology Systems Branch of the Scientific and Technical Information Center (STIC) detected errors when processing the following computer readable form:

Application Serial Number:

09/910,354A

Source:

STIC

Date Processed by STIC:

3-4-05

THE ATTACHED PRINTOUT EXPLAINS DETECTED ERRORS.

PLEASE FORWARD THIS INFORMATION TO THE APPLICANT BY EITHER:

- 1) INCLUDING A COPY OF THIS PRINTOUT IN YOUR NEXT COMMUNICATION TO THE APPLICANT, WITH A NOTICE TO COMPLY or,
- 2) TELEPHONING APPLICANT AND FAXING A COPY OF THIS PRINTOUT, WITH A NOTICE TO COMPLY

FOR CRF SUBMISSION AND PATENTIN SOFTWARE QUESTIONS, PLEASE CONTACT MARK SPENCER, TELEPHONE: 571-272-2510; FAX: 571-273-0221

TO REDUCE ERRORED SEQUENCE LISTINGS, PLEASE USE THE CHECKER VERSION 4.2.2 PROGRAM, ACCESSIBLE THROUGH THE U.S. PATENT AND TRADEMARK OFFICE WEBSITE. SEE BELOW FOR ADDRESS:

<http://www.uspto.gov/web/offices/pac/checker/chkrnote.htm>

Applicants submitting genetic sequence information electronically on diskette or CD-Rom should be aware that there is a possibility that the disk/CD-Rom may have been affected by treatment given to all incoming mail.

Please consider using alternate methods of submission for the disk/CD-Rom or replacement disk/CD-Rom.

Any reply including a sequence listing in electronic form should NOT be sent to the 20231 zip code address for the United States Patent and Trademark Office, and instead should be sent via the following to the indicated addresses:

1. EFS-Bio (<<http://www.uspto.gov/ebc/efs/downloads/documents.htm>> , EFS Submission User Manual - ePAVE)
2. U.S. Postal Service: Commissioner for Patents, P.O. Box 1450, Alexandria, VA 22313-1450
3. Hand Carry, Federal Express, United Parcel Service, or other delivery service (EFFECTIVE 01/14/05):
U.S. Patent and Trademark Office, Mail Stop Sequence, Customer Window, Randolph Building, 401 Dulany Street, Alexandria, VA 22314

Revised 01/24/05

Raw Sequence Listing Error Summary

ERROR DETECTED

SUGGESTED CORRECTION

SERIAL NUMBER

09/910/354A

ATTN: NEW RULES CASES: PLEASE DISREGARD ENGLISH "ALPHA" HEADERS, WHICH WERE INSERTED BY PTO SOFTWARE

1 Wrapped Nucleics
Wrapped Aminos The number/text at the end of each line "wrapped" down to the next line. This may occur if your file was retrieved in a word processor after creating it. Please adjust your right margin to .5; this will prevent "wrapping."

2 Invalid Line Length The rules require that a line not exceed 72 characters in length. This includes white spaces.

3 Misaligned Amino Numbering The numbering under each 5th amino acid is misaligned. Do not use tab codes between numbers; use space characters, instead.

4 Non-ASCII The submitted file was not saved in ASCII(DOS)ical, as required by the Sequence Rules. Please ensure your subsequent submission is saved in ASCII text.

5 Variable Length Sequence(s) contain n's or Xaa's representing more than one residue. Per Sequence Rules, each n or Xaa can only represent a single residue. Please present the maximum number of each residue having variable length and indicate in the <220>-<223> section that some may be missing.

6 PatentIn 2.0 "bug" A "bug" in PatentIn version 2.0 has caused the <220>-<223> section to be missing from amino acid sequences(s). Normally, PatentIn would automatically generate this section from the previously coded nucleic acid sequence. Please manually copy the relevant <220>-<223> section to the subsequent amino acid sequence. This applies to the mandatory <220>-<223> sections for Artificial or Unknown sequences.

7 Skipped Sequences (OLD RULES) Sequence(s) missing. If intentional, please insert the following lines for each skipped sequence:
(2) INFORMATION FOR SEQ ID NO X (insert SEQ ID NO where "X" is shown)
(i) SEQUENCE CHARACTERISTICS (Do not insert any subheadings under this heading)
(xi) SEQUENCE DESCRIPTION SEQ ID NO X (insert SEQ ID NO where "X" is shown)
This sequence is intentionally skipped

Please also adjust the "(ii) NUMBER OF SEQUENCES" response to include the skipped sequences.

8 Skipped Sequences (NEW RULES) Sequence(s) missing. If intentional, please insert the following lines for each skipped sequence:
<210> sequence id number
<400> sequence id number
000

9 Use of n's or Xaa's (NEW RULES) Use of n's and/or Xaa's have been detected in the Sequence Listing.
Per 1.823 of Sequence Rules, use of <220>-<223> is MANDATORY if n's or Xaa's are present.
In <220> to <223> section, please explain location of n or Xaa, and which residue n or Xaa represents.

10 Invalid <21> Response Per 1.823 of Sequence Rules, the only valid <21> responses are Unknown, Artificial Sequence, or Scientific name (Genus/species). <220>-<223> section is required when <21> response is Unknown or Artificial Sequence.

11 Use of <220> Sequence(s) missing the <220> feature and associated numeric identifiers and responses.
Use of <220> to <223> is MANDATORY if <21> "Organism" response is "Artificial Sequence" or "Unknown." Please explain source of genetic material in <220> to <223> section.
(See "Federal Register," 00/01/1998, Vol. 63, No. 104, pp. 29631-32) (Sec. 1.823 of Sequence Rules)

12 PatentIn 2.0 "bug" Please do not use "Copy to Disk" function of PatentIn version 2.0. This causes a corrupted file, resulting in missing mandatory numeric identifiers and responses (as indicated on raw sequence listing). Instead, please use "File Manager" or any other manual means to copy file to floppy disk.

13 Misuse of n/Xaa "n" can only represent a single nucleotide; "Xaa" can only represent a single amino acid.



IFW16

RAW SEQUENCE LISTING

DATE: 03/04/2005

PATENT APPLICATION: US/09/910,354A

TIME: 14:13:10

Input Set : A:\pto.da.txt

Output Set: N:\CRF4\03032005\I910354A.raw

3 <110> APPLICANT: Jarrell, et al.,

W--> 4 <120> TITLE OF INVENTION: Modular Vector Systems

6 <130> FILE REFERENCE: 2003320-0032

8 <140> CURRENT APPLICATION NUMBER: 09/910,354A

9 <141> CURRENT FILING DATE: 2001-07-20

11 <160> NUMBER OF SEQ ID NOS: 24

13 <170> SOFTWARE: PatentIn version 3.2

15 <210> SEQ ID NO: 1

16 <211> LENGTH: 23

17 <212> TYPE: DNA

18 <213> ORGANISM: PCR primer EU-1 for amplification of a vector fragment containing

W--> 19 bacterial origin of replication, Lac I gene, and pT7 promoter.

21 <400> SEQUENCE: 1

22 cauggtatat ctccttctta aag

25 <210> SEQ ID NO: 2

26 <211> LENGTH: 22

27 <212> TYPE: DNA

28 <213> ORGANISM: PCR primer Eu-2 for amplification of a vector fragment containing

W--> 29 bacterial origin of replication, Lac I gene, and pT7 promoter.

31 <400> SEQUENCE: 2

32 cucatgacca aaatccctta ac

35 <210> SEQ ID NO: 3

36 <211> LENGTH: 22

37 <212> TYPE: DNA

38 <213> ORGANISM: PCR primer EU-3 for amplification of a vector fragment containing Amp

W--> 39 gene.

41 <400> SEQUENCE: 3

42 gagattatca aaaaggatct tc

45 <210> SEQ ID NO: 4

46 <211> LENGTH: 20

47 <212> TYPE: DNA

48 <213> ORGANISM: PCR primer EU-4 for amplification of a vector fragment containing Amp

W--> 49 gene.

51 <400> SEQUENCE: 4

52 uaactagcat aaccccttgg

55 <210> SEQ ID NO: 5

56 <211> LENGTH: 21

57 <212> TYPE: DNA

58 <213> ORGANISM: PCR primer 5' Lac Z for amplification of an insert fragment containing

W--> 59 Lac Z gene.

61 <400> SEQUENCE: 5

62 augaccatga ttacgccaac g

65 <210> SEQ ID NO: 6

see item #
10 on error
summary sheet (pg. 1-4) ←

Does Not Comply
Corrected Diskette Needed

Invalid²³
response

Invalid²²
response

Invalid²²
response

Invalid²⁰
response

Invalid²¹
response

FYI: ↑ The above responses can be inserted into section

RAW SEQUENCE LISTING

DATE: 03/04/2005

PATENT APPLICATION: US/09/910,354A

TIME: 14:13:10

Input Set : A:\pto.da.txt

Output Set: N:\CRF4\03032005\I910354A.raw

CS Ame
errors

```

66 <211> LENGTH: 22
67 <212> TYPE: DNA
68 <213> ORGANISM: PCR primer 3' Lac Z for amplification of an insert fragment containing
W--> 69 Lac Z gene.
71 <400> SEQUENCE: 6
72 uuacaatttc cattcgccat tc 22
75 <210> SEQ ID NO: 7
76 <211> LENGTH: 37
77 <212> TYPE: DNA
78 <213> ORGANISM: PCR primer 5' OST for amplifying an Ori fragment from pET 19 b.
80 <400> SEQUENCE: 7
81 ctgctaagtg agcucgacag atcgctgaga taggtgc 37
84 <210> SEQ ID NO: 8
85 <211> LENGTH: 36
86 <212> TYPE: DNA
87 <213> ORGANISM: PCR primer 1N 3' Ori(s) for amplifying an Ori fragment from pET 19b.
89 <400> SEQUENCE: 8
90 aagcttgcta agtagggcgt ttttccatag gctccg 36
93 <210> SEQ ID NO: 9
94 <211> LENGTH: 36
95 <212> TYPE: DNA
96 <213> ORGANISM: PCR primer 1NT5'KAN for amplifying a fragment containing the kanamycin
W--> 97 resistance gene from pCR2.1 topo.
99 <400> SEQUENCE: 9
100 ctacctagca agctuctatc tggacaaggg aaaacg 36
103 <210> SEQ ID NO: 10
104 <211> LENGTH: 41
105 <212> TYPE: DNA
106 <213> ORGANISM: PCR primer T73' KAN for amplifying a fragment containing the
kanamycin
W--> 107 resistance gene from pCR2.1 topo.
109 <400> SEQUENCE: 10
110 ccctatagtg agtcgtatta aggcgaaaac tctcaaggat c 41
113 <210> SEQ ID NO: 11
114 <211> LENGTH: 42
115 <212> TYPE: DNA
116 <213> ORGANISM: PCR primer tcs1 for amplifying a fragment containing the luciferase.
gene
W--> 117 from pG1 II basic.
119 <400> SEQUENCE: 11
120 ttaatacgac tcaactatagg gatggaagac gccaaaaaca ta 42
123 <210> SEQ ID NO: 12
124 <211> LENGTH: 36
125 <212> TYPE: DNA
126 <213> ORGANISM: PCR primer tc58 for amplifying a fragment containing the luciferase
gene
W--> 127 from pG1 II basic.
129 <400> SEQUENCE: 12
130 gagctcactt agcagttaca atttggactt tccgcg
133 <210> SEQ ID NO: 13
134 <211> LENGTH: 36
135 <212> TYPE: DNA

```

see item #
10 on error
summary sheet

RAW SEQUENCE LISTING
PATENT APPLICATION: US/09/910,354A

DATE: 03/04/2005
TIME: 14:13:10

✓ 5 Amp
errors
↓

Input Set : A:\pto.da.txt

Output Set: N:\CRF4\03032005\I910354A.raw

136 <213> ORGANISM: PCR primer 1NT 5'KAN for amplifying a fragment containing the kanamycin

W--> 137 resistance gene from PCR 2.1 topo.

139 <400> SEQUENCE: 13

140 ctacctagca agctuctatc tggacaaggg aaaacg

36

143 <210> SEQ ID NO: 14

144 <211> LENGTH: 33

145 <212> TYPE: DNA

146 <213> ORGANISM: PCR primer 1NT 3'KAN for amplifying a fragment containing the kanamycin

W--> 147 resistance gene from PCR 2.1 topo.

149 <400> SEQUENCE: 14

150 gagctcactt agcaaggcga aaactctcaa gga

33

153 <210> SEQ ID NO: 15

154 <211> LENGTH: 37

155 <212> TYPE: DNA

156 <213> ORGANISM: PCR primer 1NT5' Ori for amplifying a fragment containing the Ori from

W--> 157 pET 19b.

159 <400> SEQUENCE: 15

160 ttgctaagt agcucgacag atcgctgaga taggtgc

37

163 <210> SEQ ID NO: 16

164 <211> LENGTH: 36

165 <212> TYPE: DNA

166 <213> ORGANISM: PCR primer 1N3' Ori(s) for amplifying a fragment containing the Ori from

W--> 167 pET 19b

169 <400> SEQUENCE: 16

170 aagcttgcta agtagggcgt ttttccatag gctccg

36

173 <210> SEQ ID NO: 17

174 <211> LENGTH: 37

175 <212> TYPE: DNA

176 <213> ORGANISM: PCR primer 3nt 5'OST for amplifying an Ori fragment.

178 <400> SEQUENCE: 17

179 ctgctaagt agcucgacag atcgctgaga taggtgc

37

182 <210> SEQ ID NO: 18

183 <211> LENGTH: 36

184 <212> TYPE: DNA

185 <213> ORGANISM: PCR primer 3nt 5'OST for amplifying an Ori fragment.

187 <400> SEQUENCE: 18

188 aagcttgcta gguaggctac gtcttgctgg cgttcg

36

191 <210> SEQ ID NO: 19

192 <211> LENGTH: 36

193 <212> TYPE: DNA

194 <213> ORGANISM: PCR primer 3nt 5'KHT for amplifying a KAN fragment.

196 <400> SEQUENCE: 19

197 ctacctagca agcuuctatc tggacaaggg aaaacg

36

200 <210> SEQ ID NO: 20

201 <211> LENGTH: 35

202 <212> TYPE: DNA

203 <213> ORGANISM: PCR primer 3nt 3'KST for amplifying an Ori(s) fragment.

205 <400> SEQUENCE: 20

206 gagctcactt agcagggcga aaactctcaa ggatc

35

↑ see item #10 on error
summary sheet

RAW SEQUENCE LISTING

DATE: 03/04/2005

PATENT APPLICATION: US/09/910,354A

TIME: 14:13:10

Input Set : A:\pto.da.txt

Output Set: N:\CRF4\03032005\I910354A.raw

✓ SAMP
errors

209 <210> SEQ ID NO: 21
210 <211> LENGTH: 37
211 <212> TYPE: DNA
212 <213> ORGANISM: PCR primer 1NT 5'ORI for amplifying an Ori(s) fragment.
214 <400> SEQUENCE: 21
215 ttgctaagtg agctcgacag atcgctgaga taggtgc 37
218 <210> SEQ ID NO: 22
219 <211> LENGTH: 36
220 <212> TYPE: DNA
221 <213> ORGANISM: PCR primer 1NT3' Ori(s) for amplifying an Ori(s) fragment.
223 <400> SEQUENCE: 22
224 aagcttgcta ggtagggcgt ttttccatag gctccg 36
227 <210> SEQ ID NO: 23
228 <211> LENGTH: 36
229 <212> TYPE: DNA
230 <213> ORGANISM: PCR primer 1NT 5'KAN for amplifying an KAN fragment.
232 <400> SEQUENCE: 23
233 ctacctagca agctuctatc tggacaaggg aaaacg 36
236 <210> SEQ ID NO: 24
237 <211> LENGTH: 33
238 <212> TYPE: DNA
239 <213> ORGANISM: PCR primer 1NT3'KAN for amplifying an Ori(s).
241 <400> SEQUENCE: 24
242 gagtcactt agcaaggcga aaactctcaa gga 33

↖ see item #10 on
error summary sheet

RAW SEQUENCE LISTING ERROR SUMMARY DATE: 03/04/2005
PATENT APPLICATION: US/09/910,354A TIME: 14:13:11

Input Set : A:\pto.da.txt
Output Set: N:\CRF4\03032005\I910354A.raw

Invalid Line Length:

The rules require that a line not exceed 72 characters in length. This includes spaces.

Seq#:11; Line(s) 116

Seq#:12; Line(s) 126

VERIFICATION SUMMARY

DATE: 03/04/2005

PATENT APPLICATION: US/09/910,354A

TIME: 14:13:11

Input Set : A:\pto.da.txt

Output Set: N:\CRF4\03032005\I910354A.raw

L:4 M:283 W: Missing Blank Line separator, <120> field identifier
L:19 M:259 W: Allowed number of lines exceeded, <213> ORGANISM:
L:29 M:259 W: Allowed number of lines exceeded, <213> ORGANISM:
L:39 M:259 W: Allowed number of lines exceeded, <213> ORGANISM:
L:49 M:259 W: Allowed number of lines exceeded, <213> ORGANISM:
L:59 M:259 W: Allowed number of lines exceeded, <213> ORGANISM:
L:69 M:259 W: Allowed number of lines exceeded, <213> ORGANISM:
L:97 M:259 W: Allowed number of lines exceeded, <213> ORGANISM:
L:107 M:259 W: Allowed number of lines exceeded, <213> ORGANISM:
L:117 M:259 W: Allowed number of lines exceeded, <213> ORGANISM:
L:127 M:259 W: Allowed number of lines exceeded, <213> ORGANISM:
L:137 M:259 W: Allowed number of lines exceeded, <213> ORGANISM:
L:147 M:259 W: Allowed number of lines exceeded, <213> ORGANISM:
L:157 M:259 W: Allowed number of lines exceeded, <213> ORGANISM:
L:167 M:259 W: Allowed number of lines exceeded, <213> ORGANISM: